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# FAX



To: **New Mexico OCD C/O Florene Davidson**

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Date: 1/30/2015

Re: **Case No. 15239: EDF and Earthworks  
Submission of Comments and Modifications**

From: **Scott Anderson**

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**Comments:**

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COMMENTS : 10

MODIFICATIONS : 19

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January 30, 2015

David Catanach  
Director, Oil Conservation Division  
Energy, Minerals and Natural Resources Department  
1200 South Saint Francis Drive,  
Santa Fe, New Mexico 87505

via U.S.P.S. / fax

**RE: Case No. 15239 - Application of the New Mexico Oil and Gas Association to Repeal and Replace Title 19, Chapter 15, Part 34 of the New Mexico Administrative Code Addressing Produced Water, Drilling Fluids and Other Liquid Oil Field Waste; and to Amend the Definition of Produced Water in Title 19, Chapter 15, Part 2 of the New Mexico Administrative Code.**

Dear Mr. Catanach,

Environmental Defense Fund (EDF) and Earthworks respectfully submit these written comments, and the corresponding modifications (attached), in connection with Oil Conservation Division (OCD) Case No. 15239 concerning the Application of the New Mexico Oil and Gas Association (NMOGA) to repeal and replace Title 19, Chapter 15, Part 34 of the New Mexico Administrative Code (NMAC) addressing produced water, drilling fluids and other liquid field waste, and the definition of produced water. EDF is a national organization representing nearly one million members nationwide, many of whom care deeply about the environmental impacts associated with oil and gas development, public health and clean water.

Earthworks is a nonprofit organization dedicated to protecting communities and the environment from the adverse impacts of mineral and energy development while promoting sustainable solutions. Earthworks stands for clean air, water and land, healthy communities, and corporate accountability. We work for solutions that protect both the Earth's resources and our communities.

Researchers estimate that 21 billion barrels of produced water are generated each year in the U.S. (Clark & Veil, 2009), and this quantity is expected by many to increase. In water-scarce regions such as New Mexico, limited freshwater resources and high disposal costs may make recycling and re-use more viable options for produced water management (SPE White Paper, Challenges in Reusing Produced Water). However, recycling and re-use of increasing volumes of produced water magnifies the volume of water stored, handled, and transported, and these collateral functions must also be managed and maintained properly to minimize the risk of spills. Otherwise, recycling and re-use could cause more problems than it solves.



Robust regulation of produced water recycling, handling, storage and transport that reflects industry's current and rapidly evolving leading practices (and technology) is an important component of the OCD's efforts to mitigate effects of oil and gas development. We are pleased to note that several provisions in the proposed regulation – if enacted and enforced – will be particularly helpful.

First, we support requirements for reporting and recordkeeping proposed at 19.15.34.9.E and 19.15.34.F NMAC (draft), and expect these, with only slight revisions, to encourage appropriate management of produced water, recycling and re-use. Comprehensive measurement and documentation of the volume of water received and dispensed by a recycling facility, and the source and disposition of produced water, will also streamline inspections, identify shifting industry practices, aid researchers and encourage compliance with disposition regulations.

Second, 19.15.34.11 NMAC (draft) outlines critical siting restrictions that will minimize impacts from regular operation and any potential spills and leaks from recycling containments on communities and sensitive ecosystems.

Third, we are encouraged to note that OCD included design, construction and operations specifications for recycling containments. With modest changes discussed below, certain of these specifications will represent nationally leading practices. Specifically, requirements for double-lined pits, leak detection and monitoring systems, weekly inspection of leak detection and monitoring equipment, and 3-foot freeboard. 19.15.34.12.A NMAC (draft). Mandatory, frequent inspections of leak detection and monitoring equipment at recycling containments is especially important for maintaining the design and construction specifications throughout the useful life of the recycling containment and facilitating early detection to limit the size of leaks and spills.

Finally, we strongly approve of the OCD's proposed site closure instructions, which require the operator of a recycling facility to "remov[e] all fluids, contents, and synthetic liners and transfer[] these materials to a division approved facility." 19.15.34.14.B NMAC (draft). It is clear from this provision that on-site burial of any materials stored or accumulated in recycling containments is not an option for closure and remediation, and also clear that residuals from produced water storage and treatment must be disposed of properly. This provision represents a significant stride forward in mitigating long-term impacts associated with the storage of water and residuals from its treatment.

We anticipate that reporting and recordkeeping, siting restrictions, up-to-date design and construction specifications, and thorough closure instructions will help reduce impacts to public health and the environment potentially associated with produced water recycling and re-use. The comments to follow outline our recommendations for improving the already good proposals discussed above, as well as suggested adjustments to other important provisions.

**1. 19.15.34.8 NMAC Requirements for Disposition by Use, Recycling Facilities or Disposal of Produced Water**



As a preliminary manner, we note that the terms “recycling,” “re-use” and “disposition by use,” appear to be used interchangeably in this section, and elsewhere in the rule. If there are key distinctions between those terms, we suggest that the OCD clarify what is meant by each. If not, we suggest that the OCD eliminate duplicative terms to reduce confusion.

19.15.34.8.A.NMAC – Recycling or disposition by use of produced water

The proposed regulation at 19.15.34.8.A.1 NMAC (draft) would be more protective of freshwater, public health and the environment, and more consistent with current OCD policy, if the OCD added language prohibiting the use of produced water, drilling fluid or other oil field liquids from use in drilling or plugging activities above the base of protected water. Use of produced water or other recycled fluids in these zones may expose fresh water to contaminants.

The new OCD form C-147 already contains such a prohibition. The form states- in bold- that “the re-use of produced water may NOT be used in fresh water zones in drilling or plugging operations.” OCD Form C-147. Likewise, the Notice of Re-use of Produced Water, Drilling Fluids and Other Liquid Oil Field Waste posted on 9-9-13 states that “the re-use of produced water is NOT permitted for any use which involves contact with fresh water zones.” Notice, at 1 (emphasis in the original).

This Important provision should be explicitly stated in the regulation in order to make it binding, and to improve transparency for applicants, as follows:

No permit or registration is required from the division for the disposition by use of produced water for drilling, completion, producing, pressure maintenance or plugging of wells pursuant to 19.15.34 NMAC, provided however that produced water shall not be re-used above the base of fresh water.

19.15.34.8.A.1 NMAC (draft).

In 19.15.34.8.A.2. NMAC (draft), OCD contemplates an application and approval process for methods of disposition by use not specified in 19.15.34.8.A.1 NMAC (draft). The provision could be improved to enhance transparency of the application process, empower the division district offices to reject or condition an application for disposition by use of produced water, and to authorize requests for additional information.

Specifically, we propose small but important changes to the regulations to give district offices clear authority to approve or reject applications, to impose conditions of approval, and to request additional information if needed. Also, the application requirements outlined in OCD Form C-147- particularly the analyte testing and volume projections- should be set forth explicitly in the rule. Finally, all analysis submitted to the OCD will be useful only to the extent it is reliable, and therefore analysis should performed by an independent commercial laboratory.



A proposed edit of 19.15.34.8.A.2. NMAC (draft) to address these concerns is as follows:

A. Recycling or disposition by use of produced water.

...

(2) Any other disposition by use of produced water ~~requires prior approval~~ must be approved by the appropriate division district office ~~on form C-147~~. Approval decisions, and any conditions of approval, requirements will be determined by the district office based upon ~~the proposed use~~:

(i) the proposed use;

(ii) laboratory analyses, performed by an independent commercial laboratory, for NORM, gas range and diesel range organics, major cations and anions; benzene, toluene, ethyl benzene and xylenes (BTEX); RCRA metals; and total dissolved solids (TDS) of fluid to be re-used;

(iii) a description of the proposed use; and volume of produced water to be used on a monthly and annual basis; and

(iv) any other information required to show that the use will cause no adverse impact on groundwater or surface water.

See C-147; 19.15.34.8(A)(2) NMAC (draft).

Additionally, we note that the scientific literature describing the constituents of concern that may be present in produced water, the studies describing the limitations on safe beneficial re-use of produced water, and industry practices are rapidly evolving. We recommend that the OCD develop an internal protocol or set of procedures to keep abreast of the literature, relevant studies and industry practices, and to incorporate all three into the regulations as appropriate. The sooner OCD can identify the most toxic pollutants of concern and develop numerical limits regarding such pollutants the better.

We also suggest amending 19.15.34.8.A.4 NMAC (draft) for consistency within the proposed regulation, specifically sections 19.15.34.8.B.1 and 19.15.34.12 NMAC (draft). This amendment would read:

All produced water for recycling or disposition by use shall be handled and stored in a manner that will protect fresh water, public health and the environment and afford reasonable protection against contamination of fresh water.

This amendment would more closely mirror the Environment, Minerals, and Natural Resources Department (EMNRD)'s goals, and reflect the fact that there are risks to public health and the environment, not only fresh water, posed by improper handling and storage of produced water.

19.15.34.8.B NMAC – Disposal of Produced Water



We suggest the following edits to 19.15.34.8.B NMAC (draft), to help clarify the OCD's intent that disposal of produced water must be adequately protective of freshwater, public health and the environment, and to prevent unrestricted use of produced water for drilling in freshwater zones:

B. Disposal of produced water. Persons disposing of produced water shall use one of the following disposition methods in a manner that does not constitute a hazard to fresh water, public health or the environment:

- (1) ~~Disposition in a manner that does not constitute a hazard to fresh water, public health, or the environment;~~ d) Delivery to a permitted salt water disposal well or facility, secondary recovery or pressure maintenance injection facility, a surface waste management facility or permanent pit permitted pursuant to 19.15.17 NMAC; or to a drill site for use in drilling fluid used exclusively below the base of fresh water; -or
- (2) Use in accordance with 19.15.34 NMAC or other authorization from the division.

19.15.34.8.B. NMAC (draft). The purpose of this edit is two-fold. First, moving the general "hazard to freshwater, public health or the environment" clause to the introduction requires that all disposal options must meet this criteria. Second, limiting use of produced water as drilling fluid reflects the concerns we articulated above regarding the potential contamination of fresh water zones. (See Comments, Section 19.15.34.8.A.1 NMAC(draft)).

## 2. 19.15.34.9 RECYCLING FACILITIES

### 19.15.34.9(A) and (B) – Registration and Permitting

OCD's proposed registration requirements bifurcate procedures for facilities that are on-lease, and facilities that would have been, or will be reviewed and permitted in connection with another EMNRD permit program. We understand that, if administered correctly, this policy may reduce redundancy for both OCD and operators. However, the registration provisions do not give the Division an opportunity to review plans and determine whether the facilities are in all ways appropriate under the circumstances.

Moreover, the substances to be stored in tanks, as with other recycling containments, contain compounds which could be damaging to public health and the environment in the event of an uncontrolled release. To reduce the hazard and magnitude of unconstrained releases from tanks, we suggest that the OCD require secondary containments in this section. This is even more critical for tanks that do not undergo permitting scrutiny.

We propose the following changes to address these concerns:

B. Registration of a recycling facility is required in the following circumstances:

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(6) when the recycling facility is used with dedicated above ground, unlined, hard-sided tanks used in accordance with the manufacturer's standards and secondary containment that are externally visually inspected weekly when holding fluids and a log is kept of the inspections made available to the division upon request; or

To the extent registered facilities are not subject to the same or more protective requirements as those set forth in 19.15.34 NMAC, the division may impose additional requirements upon registration.

19.15.34.9 NMAC(draft).

19.15.34.9(E) & (F) – Recordkeeping and Reporting

Again, we are encouraged by the recordkeeping and reporting requirements at 19.15.34.9(E) and (F) NMAC (draft). However, reporting and recordkeeping could be improved by requiring operators to report the sources and disposition of recycled fluids, in addition to fluid volumes received and disbursed by recycling facilities. Additionally, we suggest that the OCD clarify the term "source" as it is used in these provisions.

Under 19.15.34.9(E) NMAC (draft), operators must record and report volumes of water received and disposed of by recycling facilities. Under 19.15.34.9(F), operators need only record the source and disposition location of recycled water, and make those records available upon request. Reliable and required reporting of the sources and disposition of recycled fluids reduces clandestine (or illegal) use and disposal of produced water, and streamlines inspections for the Division. The same information is useful to industry, to service providers interested in identifying unmet demand for storage, handling, and treatment. And, to the extent reporting of this information makes the recycling and re-use process more transparent, may allay public concerns about the process and OCD management.

We suggest that the OCD clarify that the term "source," as used in 19.15.34.9(F) NMAC (draft) includes the specific well from which the produced water is taken, the location of the well, and the well operator. This information is important for tracking and research because the constituents in produced water vary from well to well, formation to formation, and over time. In addition, we encourage the agency to clarify the frequency and / or the conditions under which these forms must be submitted.

We note that the reporting form identified in 19.15.34.9(E) NMAC (draft) has not yet been drafted, and suggest that OCD draft the new form to require operators to report records required by both 19.15.34.9(E) and (F) NMAC (draft).

**3. Design and Construction Specifications for a Recycling Containment - 19.15.34.12 NMAC**



There are two areas for improvement of this important part of the regulation; the first for consistency with other sections of the regulation, and the second for clarity and to reflect actual practice.

19.15.34.12.A.1. NMAC contains a good blanket statement regarding construction sufficient to prevent of release of fluids and overtopping during weather events, and requires that the recycling containment be designed and constructed "to ensure the confinement of produced water." 19.15.34.12.A.1. NMAC. We do not dispute the utility and importance of this provision, but suggest that the OCD amend the language to reflect all contents that may be stored in recycling containments.

The regulation, at 19.15.34.10.B. NMAC, lists other examples of fluids which may be contained in recycling containments:

such fluids may include fresh water, brackish water, recycled and treated water, fluids added to water to facilitate well drilling or completion, water produced with oil and gas, flowback from operations, water generated by an oil or gas processing facility or other waters that are gathered for well drilling or completion but may not include any hazardous waste.

19.15.34.10.B. NMAC. To reflect this variability in the fluids that may be stored in a recycling containment, we recommend amending 19.15.34.12.A.1 as follows:

(1) The operator shall design and construct a recycling containment to ensure the confinement of ~~produced water~~ all contents stored in the containment to prevent releases and to prevent overtopping due to wave action or rainfall.

The amended language would require the design and construction of recycling containments to ensure confinement of all types of fluid which may be stored in a recycling containment under the regulation.

The proposed regulations should also be amended to clarify that tanks are included in the definition of "recycling containment" at 19.15.34.7.B. and also to provide key specifications for the design and construction of tanks used to store fluids used in connection with produced water re-use and recycling. We note that many of the design and construction specifications currently outlined in 19.15.34.12 only apply to pits. To the extent that tanks may be used in connection with produced water re-use and recycling, we suggest that OCD add to this section detailed tank design, construction and operational specifications to minimize the threat and magnitude of spills and leaks.

#### **4. Closure and Site Reclamation Requirements for Recycling Containments - 19.15.34.14 NMAC**

As drafted, the proposed regulation governing closure and site reclamation requirements for recycling containments is a step forward, and represents a key component in the OCD's efforts to mitigate the long-term impacts to public health and the environment that may result from produced water re-use and recycling. There are several ways to make the OCD's oversight of site closures more robust.



19.15.34.14.C NMAC – Site Closure Testing and Lab Analysis

First, a single five-point composite sample, as currently required in the proposed 19.15.34.14.C NMAC (draft), may not be sufficient in all circumstances, particularly where recycling facilities or containments have large footprints. The provision should be amended to allow OCD flexibility and authority to request additional sampling where needed. Second, to ensure accurate and reliable results, any sampling should be conducted by an independent, certified lab.

The following edit addresses these concerns:

C. The operator shall test the soils beneath the containment for contamination with a five-point composite sample which includes stained or wet soils, if any, and such additional samples as may be required by the OCD, and those samples shall be analyzed by an independent, certified lab, for the constituents listed in Table I below, and any other constituents that may be required by the OCD.

19.15.34.14.C NMAC (draft).

As mentioned previously in connection with 19.15.34.8(A)(2) NMAC (draft), the OCD would be wise to develop a procedure, or set of procedures to keep abreast of the evolving understanding of constituents of concern and incorporate those constituents as necessary in site closure and reclamation testing.

**5. 19.15.34.17 NMAC - Transportation**

We are pleased that the OCD is updating its regulations governing transportation of produced water, and believe that registration of produced water transporters is useful in minimizing transportation related spills and clandestine dumping episodes. To more comprehensively reflect transportation risks, we recommend that the OCD clarify that this section applies to all recycled fluid products, in addition to “produced water, drilling fluids and liquid oil field waste.” An amendment to this effect is as follows:

19.15.34.17 A. A person shall not transport recycled fluids, produced water, drilling fluids or liquid oil field waste, including drilling fluids and residual liquids in liquid oil field equipment, except for small samples removed for analysis, by motor vehicle from a lease, central tank battery of other facility without an approved form C-133. The transporter shall maintain a copy of the approved form C- 133 in the transporting vehicle.

B. A person may apply for authorization to move recycled fluids, produced water, drilling fluids or liquid oil field waste by motor vehicle by filing a complete form C-133 with the division’s Santa Fe office. Authorization is granted upon the division’s approval of form C-133.



C. An owner or operator shall not permit recycled fluids, produced water, drilling fluids or liquid oil field waste to be removed from its leases or field facilities, except for small samples removed for analysis, by motor vehicle except by a person possessing an approved form C-133. The division shall post a list of currently approved form C-133s, authorization to move liquid waste, on its website. The list of form C-133s posted on the division's website on the first business day of each month shall be deemed notice of valid form C-133s for the remainder of the month.

#### 19.15.34.17 NMAC.

Another way to reduce risks associated with unlicensed transporters is to require transporters to disclose key information during registration. In addition to the information already required on OCD Form 133, we recommend that a person who transports produced water, drilling fluids and liquid oil field waste be required to submit to the Division additional information:

- vehicle identification number;
- affidavits from recycling facilities used by the transporter verifying that the transporter is authorized to use each recycling facility; and
- certification by the transporter regarding the leak-free condition and water-tight design of the truck.

We note that this information could be added to the disclosures already required on form C-133.

#### Conclusion

The proposed regulations represent an important step towards identifying, mitigating and monitoring the environmental impacts associated with produced water re-use and recycling. We look forward to enactment of comprehensive recordkeeping and reporting requirements, siting restrictions, up-to-date design, construction, and monitoring specifications for containments used to store produced water and other recycled fluids, and strict controls for site closure.

At the same time, there are important revisions OCD needs to make to the proposed language. We look forward to working collaboratively with the Division and other stakeholders to finalize these important safeguards. Please do not hesitate to contact us if you wish to discuss these comments further.



Sincerely,

A handwritten signature in black ink, appearing to read "A. Anderson", with a long horizontal flourish extending to the right.

Scott Anderson  
Senior Policy Director,  
U.S. Climate and Energy Program  
Environmental Defense Fund  
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A handwritten signature in black ink, appearing to read "Pete Dronkers", with a stylized, cursive script.

Pete Dronkers  
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**EDF/EARTHWORKS MODIFICATIONS TO PROPOSED 19.15.34 NMAC  
JANUARY 30, 2015**

**STATE OF NEW MEXICO  
ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT  
OIL CONSERVATION COMMISSION**

APPLICATION OF THE NEW MEXICO OIL AND GAS ASSOCIATION TO REPEAL AND REPLACE TITLE 19, CHAPTER 15, PART 34 OF THE NEW MEXICO ADMINISTRATIVE CODE ADDRESSING PRODUCED WATER, DRILLING FLUIDS AND OTHER LIQUID OIL FIELD WASTE; AND TO AMEND THE DEFINITION OF PRODUCED WATER IN TITLE 19, CHAPTER 15, PART 2, OF THE NEW MEXICO ADMINISTRATIVE CODE.

CASE NO. *JS-2. 9*

**APPLICATION FOR RULEMAKING**

The New Mexico Oil and Gas Association ("NMOGA") applies to the New Mexico Oil Conservation Commission ("Commission") for an order repealing Title 19, Chapter 15, Part 34 of the New Mexico Administrative Code ("NMAC") and replacing it with the proposed rule attached hereto as Exhibit A. NMOGA also seeks an order amending the definition of "produced water" in Title 19, Chapter 15, Part 2, NMAC, as reflected in Exhibit B attached hereto. The intended effects of the proposed rule and amendment are to:

1. Encourage and promote the recycling or re-use of produced water in the production of oil and gas in a manner that provides reasonable protection to fresh waters, the public health, and the environment;
2. Clarify and codify when the disposition by use of produced water requires prior approval by the New Mexico Oil Conservation Division and when registration is sufficient;
3. Require produced water recycling facilities subject to the proposed rule to either be permitted or registered with the Division;
4. Permit by rule produced water recycling containments for a limited period of time to store, treat and recycle produced water for use in the drilling, completion, production or plugging of oil and gas wells;

**EDF/EARTHWORKS MODIFICATIONS TO PROPOSED 19.15.34 NMAC  
JANUARY 30, 2015**

5. Prevent any use of recycling containments for the disposal of produced water or other oilfield wastes;

6. Adopt for the proposed produced water recycling containments the applicable siting, design, construction, operation, closure and site reclamation provisions similar to those recently approved by the Commission for multi-well fluid management pits in Title 19, Chapter 15, Part 17, NMAC, under Order R-13506-D, but providing that:

a. Primary liners can be "45-mil LLDPE string reinforced" or "geomembrane (brazed 6 oz min) monolithic with a coating of HPCRPU (high performance chemical resistant polyuria liners)";

b. Secondary liners shall be "30-mil LLDPE string reinforced or equivalent with hydraulic conductivity no greater than  $1 \times 10^{-9}$  cm/sec.";

c. Leak detection systems can consist of "200-mil geonet drainage geotextile";

d. Operators must inspect recycling containments on a monthly basis for migratory birds or other wildlife even if the containment is netted; and

e. Upon closure EPA Method 8015M shall be used to test for TPH rather than Method 418.1 and EPA Method 8260B shall be used to test for Benzene rather than Method 8015M.

7. Establish when and what type of financial assurance is required for operators of produced water recycling containments and when that financial assurance can be released;

8. Adopt provisions for seeking a variance from the requirements of the proposed rule;

**EDF/EARTHWORKS MODIFICATIONS TO PROPOSED 19.15.34 NMAC  
JANUARY 30, 2015**

9. Retain the current provisions of 19.15.34.8 through 19.15.34.12 addressing and regulating the transportation of produced water, drilling fluids and other liquid oilfield wastes;

10. Adopt provisions for the immediate enforcement of the proposed rule by the New Mexico Oil Conservation Division; and

11. Modify the definition of "produced water" in Title 19, Chapter 15, Part 2, NMAC, to match the definition of "produced water" in Section 70-2-33(K) of the Oil and Gas Act.

Pursuant to the Commission's rules, a proposed legal notice for publication is attached hereto as Exhibit C should this matter be set for hearing before the Commission.

WHEREFORE, the New Mexico Oil and Gas Association respectfully requests that the Commission enter an order:

A. Repealing Title 19, Chapter 15, Part 34 of the New Mexico Administrative Code and replacing it with the proposed rule attached hereto as Exhibit A;

B. Modifying the definition of "produced water" in Title 19, Chapter 15, Part 2 as reflected in the proposed amendment attached hereto as Exhibit B, and

C. Certifying the proposed rule and modification for publication in the New Mexico Register as required by statute.

Respectfully Submitted,

To LAND & HART, L.

By:

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ATTORNEYS FOR  
THE NEW MEXICO OIL AND GAS ASSOCIATION

**EDF/EARTHWORKS MODIFICATIONS TO PROPOSED 19.15.34 NMAC  
JANUARY 30, 2015**

TITLE 19 NATURAL RESOURCES AND WILDLIFE  
CHAPTER 15 OIL AND GAS  
PART 34 PRODUCED WATER, DRILLING FLUIDS AND LIQUID OIL FIELD WASTE

19.15341 ISSUING AGENCY: Energy, Minerals and Natural Resources Department, Oil Conservation Commission.

19.15342 SCOPE: 19.15.34 NMAC applies to the transportation, disposal, recycling, re-use or the direct surface or subsurface disposition by use of water produced or used in connection with the development or production of oil or gas or both; in road construction or maintenance, or other construction; in the generation of electricity or in other industrial processes. 19.15. NMAC also applies to the transportation of drilling fluids and liquid oil field waste.

19.15343 STATUTORY AUTHORITY: 19.15.34 NMAC is adopted pursuant to the Oil and Gas Act, NMSA 1978, Section 70-2-12(8)(15), which authorizes the division to regulate the disposition of water produced or used in connection with the drilling for or producing of oil and gas or both and 70-2-12(8)(21) which authorizes the regulation of the disposition of nondomestic wastes from the exploration, development, production or storage of crude oil or natural gas.

19.15344 DURATION: Permanent.

19.15345 EFFECTIVE DATE: \_\_\_\_\_

19.15346 OBJECTIVE: To encourage the recycling or disposition of produced water by use in a manner that will afford reasonable protection against contamination of fresh water and establish procedures by which persons may transport and dispose of produced water, drilling fluids and other liquid oil field waste.

19.15347 DEFINITIONS: These definitions apply to 19.15.34.2 NMAC through 19.15.34.21 NMAC.

A. "Recycling facility" is a stationary or portable facility used exclusively for the treatment, re-use or recycling of produced water intended for disposition by use. A recycling facility does not include oilfield equipment such as separators, heater treaters and scrubbers in which produced water may be used.

B. "Recycling containment" is a storage containment which incorporates a synthetic liner as the primary containment device and is used solely in conjunction with a recycling facility for the storage, treatment or recycling of produced water only for the purpose of drilling, completion, production or plugging of wells used in connection with the development of oil or gas or both.

C. "Treatment" refers to the reconditioning of produced water to a reusable form and may include mechanical and chemical processes.



**EDF/EARTHWORKS MODIFICATIONS TO PROPOSED 19.15.34 NMAC  
JANUARY 30, 2015**

**19.15.34.8 REQUIREMENTS FOR DISPOSITION BY USE, RECYCLING FACILITIES OR DISPOSAL OF PRODUCED WATER:**

**A. Recycling or disposition by use of produced water.**

(1) No permit or registration is required from the division for the disposition by use of produced water for drilling, completion, producing, pressure maintenance or plugging of wells pursuant to 19.15.34 NMAC, provided however that produced water shall not be re-used above the base of fresh water.

(2) Any other disposition by use of produced water ~~requires prior approval~~ must be approved by the appropriate division district office ~~on form C-147. Approval requirements decisions, and any conditions of approval,~~ will be determined by the district office based upon: ~~the proposed use.~~

- i. the proposed use;
- ii. laboratory analyses, performed by an independent commercial laboratory, for NORM, gas range and diesel range organics, major cations and anions; benzene, toluene, ethyl benzene and xylenes (BTEX); RCRA metals; and total dissolved solids (TDS) of fluid to be re-used;
- iii. a description of the proposed use; and volume of produced water to be used on a monthly and annual basis; and
- iv. any other information required to show that the use will cause no adverse impact on groundwater or surface water.

(3) Research using produced water is to be encouraged through pilot projects approved by the appropriate division district office.

(4) All produced water for recycling or disposition by use shall be handled and stored in a manner that will protect public health and the environment and afford reasonable protection against contamination of fresh water.

(5) All operations in which produced water is used shall be conducted in a manner consistent with hydrogen sulfide gas provisions in 19.15.11.NMAC or NORM provisions in 19.15.35 NMAC, as applicable.

(6) All releases from the recycling and re-use of produced water shall be handled in accordance with 19.15.29 NMAC.

**B. Disposal of produced water.** Persons disposing of produced water shall use one of the following disposition methods, in a manner that does not constitute a hazard to fresh water, public health or the environment:

(1) ~~Disposition in a manner that does not constitute a hazard to fresh water, public health, or the environment;~~ Delivery to a permitted salt water disposal well or facility, secondary recovery or pressure maintenance injection facility, a surface waste management facility or permanent pit permitted pursuant to 19.15.17 NMAC; or to a drill site for use in drilling fluid used exclusively below the base of fresh water; or

(2) Use in accordance with 19.15.34 NMAC or other authorization from the division.

**19.15.34.9 RECYCLING FACILITIES**

A. Except where recycling facilities are part of a permitted operation for the drilling, completing, producing or plugging of oil and gas wells, all recycling facilities shall be permitted or registered with the division district office. The appropriate version of form C-147 shall be used for registration, financial assurance, or for a permit if not associated with the drilling, completing, producing and plugging of oil and gas wells. All operators or owners of the facility

**EDF/EARTHWORKS MODIFICATIONS TO PROPOSED 19.15.34 NMAC  
JANUARY 30, 2015**

shall be named in the form C-147.

**B.** Registration of a recycling facility is required in the following circumstances:

(1) when the recycling facility is an addition to a surface waste management facility permitted under 19.15.36 NMAC;

(2) when the recycling facility is an addition to the secondary recovery of oil and gas, enhanced oil recovery of oil and gas, or pressure maintenance projects permitted under 19.15.26 NMAC;

(3) when the recycling facility is an addition to a salt water disposal well permitted under 19.15.26 NMAC;

(4) when the recycling facility is an addition to pits permitted or below-grade tanks registered in accordance with 19.15.17 NMAC;

(5) when the recycling facility is used with a closed loop system that only delivers fluid for drilling or completion purposes;

(6) when the recycling facility is used with dedicated above ground, unlined, hard-sided tanks used in accordance with the manufacturer's standards and secondary containment that are externally visually inspected weekly when holding fluids and a log is kept of the inspections made available to the division upon request; or

(7) when the recycling facility is used with a recycling containment registered in accordance with 19.15.34 NMAC.

To the extent registered facilities are not subject to the same or more protective requirements as those set forth in 19.15.34 NMAC, the division may impose additional requirements upon registration.

**C.** Recycling facilities not identified in Subsection 19.15.34.9.B are required to be permitted. The appropriate division district office will determine approval requirements based upon the proposed use.

**D.** Recycling facilities may be located either onsite or offsite of a well drilling location and may serve a number of wells.

**E.** The operator of a recycling facility shall keep accurate records and shall report monthly to the division the total volume of water received for recycling and the total volume of water leaving the facility for disposition by use on form C-\_\_.

**F.** The operator of a recycling facility shall maintain accurate records that identify the sources and disposition of all recycled fluids that shall be made available for review by the division upon request.

**G.** Recycling facilities may not be used for the disposal of produced water.

**H.** The operator shall remove all fluids within 60 days from the date the operator ceases operations. The division district office may grant an extension for the removal of all fluids not to exceed two months.

**19.15.34.10 RECYCLING CONTAINMENTS:**

**A.** All recycling containments shall be registered on form C-147. All operators or owners shall be named in the form C-147.

**B.** Recycling containments may hold all fluids for use in connection with drilling, completion, producing or processing oil or gas or both. Such fluids may include fresh water, brackish water, recycled and treated water, fluids added to water to facilitate well drilling or completion, water produced with oil and gas, flowback from operations, water generated by an

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oil or gas processing facility or other waters that are gathered for well drilling or completion but may not include any hazardous waste.

C. Registered recycling containments may be operated for five years from the date on which the registration is filed with the division. The operator may extend the allowed time on an annual basis thereafter if, 30 days prior to the registration expiration, the operator files a form C-147 with an attached summary showing all monthly inspections at the containment, including the monitoring of the leak detection system, showing the containment's integrity has not been compromised.

D. Recycling containments may not be used for the disposal of produced water.

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**19.15.34.11 SITING REQUIREMENTS FOR RECYCLING CONTAINMENTS:**

A. An operator shall not locate a recycling containment:

- (1) where ground water is less than 50 feet below the bottom of the containment;
- (2) within 300 feet of a continuously flowing watercourse, or 200 feet of any other significant watercourse or lakebed, sinkhole or playa lake (measured from the ordinary high-water mark);
- (3) within 1000 feet of a permanent residence, school, hospital, institution or church in existence at the time of the initial registration;
- (4) within 500 feet of a spring or fresh water well used for domestic or stock watering purposes in existence at the time of the initial registration;
- (5) within incorporated municipal boundaries or within a defined municipal fresh water well field covered by a municipal ordinance adopted pursuant to NMSA 1978, Section 3-27-3, as amended, unless the municipality specifically approves the recycling containment in writing;
- (6) within 500 feet of a wetland;
- (7) within an area overlying a subsurface mine;
- (8) within an unstable area unless the operator demonstrates that it has incorporated engineering measures into the design to ensure that the containment's integrity is not compromised; or
- (9) within a 100-year floodplain.

B. In the absence of site-specific ground water data, the operator may use data generated by models, cathodic well lithology, published information or other tools as approved by the division district office.

C. An operator shall not locate material excavated during construction:

- (1) within 100 feet of a continuously flowing watercourse or significant watercourse;
- (2) within 200 feet from a lakebed, sinkhole or playa lake (measured from the ordinary high-water mark);
- (3) within 100 feet of a wetland; or
- (4) within a 100-year floodplain.

**19.15.34.12 DESIGN AND CONSTRUCTION SPECIFICATIONS FOR A RECYCLING CONTAINMENT:**

A. An operator shall design and construct a recycling containment in accordance with the following specifications.

(1) The operator shall design and construct a recycling containment to ensure the confinement of all contents stored in the containment produced water, to prevent releases and to prevent overtopping due to wave action or rainfall.

(2) A recycling containment shall have a properly constructed foundation and interior slopes consisting of a firm, unyielding base, smooth and free of rocks, debris, sharp edges or irregularities to prevent the liner's rupture or tear. Geotextile is required under the liner when needed to reduce localized stress-strain or protuberances that otherwise may compromise the liner's integrity. The operator shall construct the containment in a levee with an inside grade no steeper than two horizontal feet to one vertical foot (2H:1V). The levee shall have an outside grade no steeper than three horizontal feet to one vertical foot (3H:1V). The top of the levee shall

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be wide enough to install an anchor trench and provide adequate room for inspection and maintenance.

(3) Each recycling containment shall incorporate, at a minimum, a primary (upper) liner and a secondary (lower) liner with a leak detection system appropriate to the site's conditions. The edges of all liners shall be anchored in the bottom of a compacted earth-filled trench. The anchor trench shall be at least 18 inches deep.

(4) All primary (upper) liners in a recycling containment shall be geomembrane liners composed of an impervious, synthetic material that is resistant to ultraviolet light, petroleum hydrocarbons, salts and acidic and alkaline solutions. All primary liners shall be 30-mil flexible PVC, 45-mil LLDPE string reinforced or 60-mil HDPE liners or geomembrane (brazed 6 oz min) monolithic with a coating of HPCRPU (high performance chemical resistant polyurea) liners. Secondary liners shall be 30-mil LLDPE string reinforced or equivalent with a hydraulic conductivity no greater than  $1 \times 10^{-9}$  cm/sec. Liner compatibility shall meet or exceed the EPA SW-846 method 9090A or subsequent relevant publications.

(5) The operator of a recycling containment shall minimize liner seams and orient them up and down, not across, a slope of the levee. Factory welded seams shall be used where possible. The operator shall ensure field seams in geosynthetic material are thermally seamed. Prior to field seaming, the operator shall overlap liners four to six inches. The operator shall minimize the number of field seams and corners and irregularly shaped areas. There shall be no horizontal seams within five feet of the slope's toe. Qualified personnel shall perform field welding and testing.

(6) At a point of discharge into or suction from the recycling containment, the operator shall insure that the liner is protected from excessive hydrostatic force or mechanical damage. External discharge or suction lines shall not penetrate the liner.

(7) The operator of a recycling containment shall place a leak detection system between the upper and lower geomembrane liners that shall consist of 200-mil geonet drainage geotextile or two feet of compacted soil with a saturated hydraulic conductivity of  $1 \times 10^{-5}$  cm/sec or greater to facilitate drainage. The leak detection system shall consist of a properly designed drainage and collection and removal system placed above the lower geomembrane liner in depressions and sloped to facilitate the earliest possible leak detection.

(8) The operator of a recycling containment shall design the containment to prevent run-on of surface water. The containment shall be surrounded by a berm, ditch or other diversion to prevent run-on of surface water.

B. Stockpiling of topsoil. Prior to constructing containment, the operator shall strip and stockpile the topsoil for use as the final cover or fill at the time of closure.

C. Signs. The operator shall post an upright sign no less than 12 inches by 24 inches with lettering not less than two inches in height in a conspicuous place on the fence surrounding the containment. The sign shall provide the following information: the operator's name, the location of the site by quarter-quarter or unit letter, section, township and range, and emergency telephone numbers.

D. Fencing.

(1) The operator shall fence or enclose a recycling containment in a manner that deters unauthorized wildlife and human access and shall maintain the fences in good repair. The operator shall ensure that all gates associated with the fence are closed and locked when responsible personnel are not onsite.

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(2) Recycling containments shall be fenced with a four foot fence that has at least four strands of barbed wire evenly spaced in the interval between one foot and four feet above ground level.

E. Netting. The operator shall ensure that a recycling containment is screened, netted or otherwise protective of migratory birds. The operator shall on a monthly basis inspect for and, within 30 days of discovery, report the discovery of dead migratory birds or other wildlife to the appropriate wildlife agency and to the division district office in order to facilitate assessment and implementation of measures to prevent incidents from reoccurring.

**19.15.34.13 OPERATIONAL REQUIREMENTS FOR RECYCLING CONTAINMENTS:**

A. The operator shall inspect the recycling containment and associated leak detection systems weekly while it contains fluids. The operator shall maintain a current log of such inspections and make the log available for review by the division upon request

B. The operator shall maintain and operate a recycling containment in accordance with the following requirements.

(1) The operator shall remove any visible layer of oil from the surface of the recycling containment.

(2) The operator shall maintain at least three feet of freeboard at each containment.

(3) The injection or withdrawal of fluids from the containment shall be conducted in a manner that prevents damage to any liner.

(4) If the containment's liner is compromised above the fluid's surface, the operator shall repair the damage or initiate replacement of the liner within 48 hours of discovery or seek an extension of time from the division district office.

(5) If the liner is compromised below the fluid's surface, the operator shall remove all fluid above the damage or leak within 48 hours of discovery, notify the division district office pursuant to 19.15.29 NMAC and repair the damage or replace the liner.

(6) The containment shall be operated to prevent the collection of surface water run-on.

(7) The operator shall install, or maintain on site, an oil absorbent boom or other device to contain an unanticipated release.

C. A recycling containment shall be deemed to have ceased operations if less than 20% of the total fluid capacity is used every six months following the first withdrawal of produced water for use. The appropriate division district office may grant an extension to this determination of cessation of operations not to exceed six months.

**19.15.34.14 CLOSURE AND SITE RECLAMATION REQUIREMENTS FOR RECYCLING CONTAINMENTS:**

A. Once the operator has ceased operations, the operator shall remove all fluids within 60 days and close the containment within six months from the date the operator ceases operations from the containment for use. The division district office may grant an extension for the removal of all fluids not to exceed two months. The division district office may grant an extension to close the containment not to exceed six months. If the operator wants to use the containment for a purpose other than recycling then the operator must have that use approved or permitted by the division in accordance with the appropriate rules.

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B. The operator shall close a recycling containment by first removing all fluids, contents and synthetic liners and transferring these materials to a division approved facility.

C. The operator shall test the soils beneath the containment for contamination with a five-point composite sample which includes stained or wet soils, if any, and such additional samples as may be required by the OCD, and that those samples shall be analyzed by an independent, certified lab for the constituents listed in Table I below and any other constituents that may be required by the OCD.

(1) If any contaminant concentration is higher than the parameters listed in Table I, the division may require additional delineation upon review of the results and the operator must receive approval before proceeding with closure.

(2) If all contaminant concentrations are less than or equal to the parameters listed in Table I, then the operator can proceed to backfill with non-waste containing, uncontaminated, earthen material.

D. Within 60 days of closure completion, the operator shall submit a closure report on form C-\_\_, including required attachments, to document all closure activities including sampling results and the details on any backfilling, capping or covering, where applicable. The closure report shall certify that all information in the report and attachments is correct and that the operator has complied with all applicable closure requirements and conditions specified in division rules or directives.

E. Once the operator has closed the recycling containment, the operator shall reclaim the containment's location to a safe and stable condition that blends with the surrounding undisturbed area. Topsoils and subsoils shall be replaced to their original relative positions and contoured so as to achieve erosion control, long-term stability and preservation of surface water flow patterns. The disturbed area shall then be reseeded in the first favorable growing season following closure of a recycling containment. The operator shall substantially restore the impacted surface area to the condition that existed prior to the construction of the recycling containment.

F. Reclamation of all disturbed areas no longer in use shall be considered complete when all ground surface disturbing activities at the site have been completed, and a uniform vegetative cover has been established that reflects a life-form ratio of plus or minus fifty percent (50%) of pre-disturbance levels and a total percent plant cover of at least seventy percent (70%) of pre-disturbance levels, excluding noxious weeds.

G. The re-vegetation and reclamation obligations imposed by federal agencies on lands managed by those agencies shall supersede these provisions and govern the obligations of any operator subject to those provisions, provided that the other requirements provide equal or better protection of fresh water, human health and the environment.

H. The operator shall notify the division when reclamation and re-vegetation are complete.

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Table I Closure Criteria for Recycling Containments			
Depth below bottom of containment to groundwater less than 10,000 mg/l TDS	Constituent	Method*	Limit**
51 feet- 100 feet	Chloride	EPA 300.0	10,000 mg/kg
	TPH	EPA SW-846 Method 8015M	2,500 mg/kg
	GRO+DRO	EPA SW-846 Method 8015M	1000 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg
	Benzene	EPA SW-846 Method 8021B or 8260B	10 mg/kg
> 100 feet	Chloride	EPA 300.0	20,000 mg/kg
	TPH	EPA SW-846 Method 8015M	2,500 mg/kg
	GRO+DRO	EPA SW-846 Method 8015M	1000 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg
	Benzene	EPA SW-846 Method 8021B or 8260B	10 mg/kg

\* Or other test methods approved by the division.

\*\* Numerical limits or natural background level, whichever is greater.

**19.15.34.15 FINANCIAL ASSURANCE REQUIREMENTS FOR RECYCLING CONTAINMENTS:**

**A. Financial assurance.**

(1) Containmentment operators without existing financial assurance certified by a professional engineer pursuant to 19.15.8 NMAC shall furnish financial assurance acceptable to the division in the amount of the recycling containment's estimated closure and post-closure cost or \$25,000, whichever is greater.

(2) Containmentment operators providing the division with an existing financial assurance pursuant to 19.15.8 NMAC do not require additional financial assurance. These containments are limited to only the wells owned or operated by the owners of the containment. Containments delivering fluids to wells not owned or operated by the owners or operators of the containment must provide financial assurance pursuant to Paragraph (1) of Subsection A of 19.15.34.15 NMAC.

**B. Terms of financial assurance.** The financial assurance shall be on division-prescribed forms, payable to the State of New Mexico and conditioned upon the proper operation, site closure and post closure monitoring of the recycling containment as required by New Mexico statutes and division rules. The operator shall notify the division of any material change affecting the financial assurance within 30 days of discovery or notice of such change.

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C. Forfeiture of financial assurance. The division shall give the operator 20 days written notice and an opportunity for a hearing prior to forfeiting any financial assurance.

D. Forms of financial assurance. The division may accept the following forms of financial assurance.

(1) Surety bonds. A surety bond shall be executed by the applicant and a corporate surety licensed to do business in the state, and shall not be subject to cancellation.

(2) Letters of credit. A letter of credit shall be issued by a bank organized or authorized to do commercial banking business in the United States, shall be irrevocable for a term of not less than five years unless the applicant shows good cause for a shorter time period and shall provide for automatic renewal for successive, like terms upon expiration unless the issuer has notified the division in writing of non-renewal at least 90 days before its expiration date. The letter of credit shall be payable to the State of New Mexico in part or in full upon receipt from the director or the director's authorized representative of demand for payment accompanied by a notice of forfeiture. Demand may be issued 30 days prior to expiration of the letter of credit if the operator has not provided replacement financial assurance by that time.

(3) Cash accounts. An applicant shall provide financial assurance in the form of a federally insured or equivalently protected cash account or accounts in a financial institution, provided that the operator and the financial institution shall execute as to each such account a collateral assignment of the account to the division, which shall provide that only the division may authorize withdrawals from the account. In the event of forfeiture, the division may direct payment of all or part of the balance of such cash account (excluding interest accrued on the account) to itself or its designee for the recycling facility's closure.

E. Replacement of financial assurance.

(1) The division may allow an operator to replace existing forms of financial assurance with other forms of financial assurance that provide equal coverage prior to the expiration of the existing financial assurance.

(2) The division shall not release existing financial assurance until the operator has submitted, and the division has approved, an acceptable replacement.

F. Review of adequacy of financial assurance. The division may at any time not less than five years after initial acceptance of financial assurance for a recycling containment, initiate a review of such financial assurance's adequacy. Additionally, whenever the division determines that a recycling containment has not achieved the closure standards specified in 19.15.34.14 NMAC, the division may review the adequacy of the recycling containment's financial assurance, without regard to the date of its last review. Upon determination, after notice to the operator and an opportunity for a hearing, that the financial assurance is not adequate to cover the reasonable and probable cost of a recycling containment's closure and post closure monitoring, the division may require the operator to furnish additional financial assurance.

G. The division shall release a financial assurance upon the operator's or surety's written request if the recycling containment has been closed and the location remediated in accordance with 19.15.34 NMAC or has been covered by another financial assurance approved by the division. The division shall not approve a request for change of operator of a recycling containment until the new operator has the required division approved financial assurance.

H. The division may use funds in the oil and gas reclamation fund to remediate the impacts of a recycling containment if deemed necessary by the division director in the event of an emergency or insufficient financial assurance. In either case, the costs expended by the division may be recovered from the operator pursuant to NMSA 1978, Section 70-2-38. The

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operator is responsible for all costs of remediation of the recycling containment even if the costs exceed the financial assurance.

**19.15.34.16 VARIANCES:**

A. An operator may file a written request for a variance from any requirement of these rules with the division district office. The request for variance shall include:

- (1) a detailed statement explaining the need for a variance, and
- (2) a detailed written demonstration that the variance will afford reasonable

protection against contamination of fresh water.

B. The division district office shall approve or deny the variance within 60 days of receipt. If the division district office denies the variance, it shall provide the operator with the reasons for denial by certified mail, return receipt requested.

C. If a request for variance from the requirements of this rule (19.15.34.1 through 19.15.34.18 NMAC) is not approved or denied within 60 days of the date the request for variance is received by the district office, the operator may seek a hearing pursuant to 19.15.4 NMAC.

D. If the operator requests a hearing pursuant to 19.15.4 NMAC within 60 days after receipt of notice, the division shall set the matter for hearing, with notice to the operator and the appropriate division district office.

E. The operator shall provide notice of the hearing on the request for variance to the surface owner of the site by certified mail, return receipt requested, at least 20 days prior to the date of hearing.

F. Variances must receive division district office approval prior to implementation.

**19.15.34.17 TRANSPORTATION OF PRODUCED WATER, DRILLING FLUIDS AND LIQUID OIL FIELD WASTE:**

A. A person shall not transport produced water, recycled fluids, drilling fluids or liquid oil field waste, including drilling fluids and residual liquids in liquid oil field equipment, except for small samples removed for analysis, by motor vehicle from a lease, central tank battery or other facility without an approved form C-133. The transporter shall maintain a copy of the approved form C-133 in the transporting vehicle.

B. A person may apply for authorization to move produced water, recycled fluids, drilling fluids or liquid oil field waste by motor vehicle by filing a complete form C-133 with the division's Santa Fe office. Authorization is granted upon the division's approval of form C-133.

C. An owner or operator shall not permit produced water, recycled fluids, drilling fluids or liquid oil field waste to be removed from its leases or field facilities, except for small samples removed for analysis, by motor vehicle except by a person possessing an approved form C-133. The division shall post a list of currently approved form C-133s, authorization to move liquid waste, on its website. The list of form C-133s posted on the division's website on the first business day of each month shall be deemed notice of valid form C-133s for the remainder of the month.

**19.15.34.18 DENIAL OF FORM C-133:** The division may deny approval of a form C-133 if:

A. the applicant is a corporation or limited liability company, and is not registered with the secretary of state to do business in New Mexico;

B. the applicant is a limited partnership, and is not registered with the New Mexico secretary of state to do business in New Mexico;

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C. the applicant does not possess a carrier permit under the state registration system the public regulation commission administers, if it is required to have such a permit under the applicable statutes or rules; or

D. the applicant or officer, director or partner in the applicant, or a person with an interest in the applicant exceeding 25 percent, is or was within the past five years an officer, director or partner in the applicant, or a person with an interest in the applicant exceeding 25 percent in another entity that possesses or has possessed an approved form C-133 that has been cancelled or suspended, has a history of violating division or other state or federal environmental laws; is subject to a commission or division order, issued after notice and hearing, finding such entity to be in violation of an order requiring corrective action; or has a penalty assessment for violation of division or commission rules or orders that is unpaid more than 70 days after issuance of the order assessing the penalty.

**19.1534.19 CANCELLATION OR SUSPENSION OF AUTHORIZATION TO MOVE LIQUID WASTES:** A transporter's vehicular movement or disposition of produced water, drilling fluids or liquid oil field waste in a manner contrary to division rules is ground for denial of approval of form C-133 in addition to those specified in Subsection D of 19.15.34.18 NMAC. It is also cause, after notice and an opportunity for hearing, for the division to cancel or suspend a transporter's authorization to move liquid wastes.

**19.1534.20 DISPOSITION OF PRODUCED WATER AND OTHER OIL FIELD WASTE:** Except as authorized by 19.15.17 NMAC, 19.15.26.8 NMAC, 19.15.30, NMAC 19.15.34 NMAC or 19.15.36 NMAC persons, including transporters, shall not dispose of produced water or other oil field waste:

A. on or below the surface of the ground, in a pit or in a pond, lake, depression or watercourse;

B. in another place or in a manner that may constitute a hazard to fresh water, public health, or the environment; or

C. in a permitted pit or registered or permitted surface waste management facility without permission of the owner or operator of the pit or facility.

**15.15.34.21 ENFORCEMENT:**

A. The operator of a recycling facility or recycling containment shall comply with all the requirements of 19.15.34 NMAC.

B. If the division determines that the registration of a recycling facility or recycling containment or that operations at a recycling facility or recycling containment violate the requirements of 19.15.34 NMAC, the division district office shall notify the operator in writing. If the violation threatens contamination of fresh water, public health, or the environment, the notice of violation shall be signed by the director, the operator shall immediately cease all operations at the recycling facility or containment and the director may require the operator to remove all fluids, if any, in the recycling facility or containment by a date determined by the director.

C. The operator shall have 60 days from the date it is notified of a violation to remove the recycling facility or recycling containment in accordance with 19.15.34 NMAC unless the violation is corrected, an agreed compliance order providing for corrective action is entered with the division or the operator obtains a stay of the division's order as part of an application for review of the notice of violation filed by the operator.

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D. The provisions of 19.15.4 NMAC applicable to adjudicatory proceedings shall apply to these enforcement proceedings unless altered or amended by 19.15.5.10 or 19.15.34 NMAC.

E. The division may enter into an agreed compliance order prior to or after the filing of an application for an administrative compliance proceeding. An agreed compliance order shall have the same force and effect as a compliance order issued after an adjudicatory hearing.

F. After a notice of violation that threatens contamination of fresh water, public health, or the environment is issued, until the operator obtains an agreed compliance order, performs appropriate corrective action or is granted a stay, the division may not approve any permits for the operator.

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TITLE 19                   NATURAL RESOURCES AND WILDLIFE  
CHAPTER 15               OIL AND GAS  
PART 2                    GENERAL PROVISIONS FOR OIL AND GAS OPERATIONS

19.15.2.7       DEFINITIONS: These definitions apply to 19.15.2 NMAC through 19.15.39 NMAC.

P. Definitions beginning with the letter "P".

(10) "Produced water" means water that is an incidental byproduct from drilling for or the production of oil and gas. ~~these waters produced in conjunction with the production of oil or gas and commonly collected at field storage, processing or disposal facilities including lease tanks, commingled tank batteries, burn pits, lease ACT units and community or lease salt water disposal systems and that may be collected at gas processing plants, pipeline drips and other processing or transportation facilities.~~



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EXHIBIT C  
TONMOGA'S APPLICATION FOR RULEMAKING

Case No. 15" < 31 : Application Of The New Mexico Oil And Gas Association To Repeal And Replace Title 19, Chapter 15, Part 34 Of The New Mexico Administrative Code Addressing Produced Water, Drilling Fluids And Other Liquid Oil Field Waste; And To Amend The Definition Of Produced Water In Title 19, Chapter 15, Part 2, Of The New Mexico Administrative Code. The State of New Mexico, through its Oil Conservation Commission ("Commission"), hereby gives notice that the Commission will conduct a public hearing at 9:00 A. M. on , , in Porter Hall at 1220 South Saint Francis Drive, Santa Fe, New Mexico, to consider the Application of the New Mexico Oil and Gas Association for an order repealing Title 19, Chapter 15, Part 34 of the New Mexico Administrative Code ("NMAC") and replacing it with a new proposed rule. Applicant also seeks to amend the definition of "produced water" in Title 19, Chapter 15, Part 2, NMAC. The proposed rule and amendment are intended to:

- (1) Encourage and promote the recycling or re-use of produced water in the production of oil and gas in a manner that provides reasonable protection to fresh waters, the public health, and the environment;
- (2) Clarify and codify when the disposition by use of produced water requires prior approval by the New Mexico Oil Conservation Division and when registration is sufficient;
- (3) Require produced water recycling facilities subject to the proposed rule to either be permitted or registered with the Division;
- (4) Permit by rule produced water recycling containments for a limited period of time to store, treat and recycle produced water for use in the drilling, completion, production or plugging of oil and gas wells;
- (5) Prevent any use of recycling containments for the disposal of produced water or other oilfield wastes;
- (6) Adopt for the proposed produced water recycling containments the applicable siting, design, construction, operation, closure and site reclamation provisions similar to those recently approved by the Commission for multi-well fluid management pits in Title 19, Chapter 15, Part 17, NMAC, under Order R-13506-D, but providing that (a) primary liners can be "45-mil LLDPE string reinforced" or "geomembrane (brazed 6 oz min) monolithic with a coating of HPCRPU (high performance chemical resistant polyuria liners)"; (b) secondary liners shall be "30-mil LLDP string reinforced or equivalent with hydraulic conductivity no greater than  $1 \times 10^{-9}$  cm/sec."; (c) leak detection systems can consist of "200-mil geonet drainage geotextile"; (d) operators must inspect recycling containments on a monthly basis for migratory birds or other wildlife even if the containment is netted; and (e) upon closure EPA Method 801SM shall be used to test for TPH rather than Method 418.1 and EPA Method 82608 shall be used to test for Benzene rather than Method 801SM;
- (7) Establish when and what type of financial assurance is required for operators of produced water recycling containments and when that financial assurance can be released;
- (8) Adopt provisions for seeking a variance from the requirements of the proposed rule;



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- (9) Retain the current provisions of 19.15.34.8 through 19.15.34.12 addressing and regulating the transportation of produced water, drilling fluids and other liquid oilfield wastes;
- (10) Adopt provisions for the immediate enforcement of the proposed rule by the New Mexico Oil Conservation Division; and
- (11) Modify the definition of "produced water" in Title 19, Chapter 15, Part 2, NMAC, to match the definition of "produced water" in Section 70-2-33(K) of the Oil and Gas Act.

The proposed rule and amendment are available from Division Administrator Florenc Davidson at (505) 476-3458 or can be viewed on the Division's web site at <http://www.emnrd.state.nm.us/ocd/whatsnew.htm>. Modifications to the proposed rule or amendment must be received by the Division no later than 5:00 P.M. on \_\_\_\_\_,

Persons intending to offer technical testimony at the hearing must file six copies of a Pre-hearing Statement conforming to the requirements of 19.15.3.11 NMAC, and six copies of all exhibits the person will offer in evidence at the hearing, no later than \_\_\_\_\_, Proposed modifications and written comments may be hand-delivered or mailed to Ms. Davidson at 1200 South Saint Francis Drive, Santa Fe, New Mexico 87505, or may be faxed to Ms. Davidson at (505) 476-3462. Pre-hearing Statements must be hand-delivered or mailed to Ms. Davidson at the above address. If you are an individual with disability who is in need of a reader, amplifier, qualified sign language interpreter, or any other form of auxiliary aid or service to attend or participate in the hearing, please contact Ms. Davidson at (505) 476-3458 or the New Mexico Relay Network at 1-800-659-1779.

Given under the seal of the State of New Mexico Oil Conservation Commission at Santa Fe, New Mexico on this \_\_\_\_\_ day of \_\_\_\_\_, 2014.

STATE OF NEW MEXICO  
OIL CONSERVATION DIVISION  
Jami Bailey  
Chair, Oil Conservation Commission